

The requirement also stated that the chemical structure of each elected species should be provided.

The elected species of "M adapter" has the sequence

5'-gtctccacgtcttattctgt
tgtgagaagcagaggtgcagaataagacaagcp

as shown on page 44, lines 6-7 of the specification.

The elected species of "Q adapter" has the sequence

5'-ggtagacagacatggaggtgcagactaaaa
ccaugucuguaccuccacgucugauuuuucup

as shown on page 44, lines 2-3 of the specification.

Applicants respectfully request that the requirement to provide the chemical structures of the elected restriction endonucleases be set aside. These endonucleases are clearly identifiable to one skilled in the art by their stated names. The enzymes tend to be large proteins whose exact structure may not even be fully elucidated; see, for example, the enclosed article dated June 2001 pertaining to the structure of Sau3AI. As stated on page 23583 of the article, the molecular weight of the enzyme is believed to be over 56,000. It would serve no clear purpose to attempt to provide the structures of these enzymes in this communication.

Applicants traverse the election of species requirement. The invention can be carried out using any of a large number of known restriction endonucleases as the first and second endonucleases. With regard to the Exo III resistant and Exo III susceptible linkers, as stated in the specification, an "Exo III resistant linker" refers to "a linker which comprises a 3'-overhang" (page 20, lines 6-7), and "Exo III susceptible linkers" refers to "linkers which comprise either a 5'-overhang or a blunt end" (page 20, lines 15-16). Clearly, thousands of linkers could be designed which meet these structural requirements.